

fulvous, with the shafts black, instead of being lighter in the interior and edged with darker chestnut, as is the case in the latter species. From *Amydrus morio* of Abyssinia and Western Africa, the only other member of the group as now restricted, it is at once distinguishable by its smaller size and the paler colouring of the primaries.

Mr. Tristram shot these birds on the 30th of March last, at Mar-Saaba, in the valley of the Hebron. They had their nest in the rocks; but he was unable to reach it. The discovery is of much interest, as the bird belongs to a purely African group not hitherto met with in Palestine.

BIBLIOGRAPHICAL NOTICES.

General Report upon the Zoology of the several Pacific Railroad Routes. Part II. Birds. By SPENCER F. BAIRD, Assistant Secretary, Smithsonian Institution; with the co-operation of JOHN CASSIN and GEORGE N. LAWRENCE. 1 vol. 4to, Washington, 1858.

IN our notice of the first Part* of this important work, some account is given of the way in which the large mass of zoological *matériel* collected by the various expeditions sent out by the United States Government to investigate the most practicable railroad route from the Mississippi to the Pacific Ocean, was proposed to be treated. The second Part, which has just issued from the press, serves to confirm our opinion as to the excellence of the method chosen, and the great value of the results thus likely to be obtained. The present volume (in which Prof. Baird, the general editor, has been ably assisted by Messrs. Cassin and Lawrence) contains a systematic account of the birds collected or observed by the parties organized under the direction of the War Department for exploring the different railroad routes; and, as in the volume on Mammals, by the insertion of the comparatively few species not noticed by these expeditions, it has been made a complete exposition of the present state of our knowledge of the birds of America north of Mexico. For, besides the specimens collected by the railroad surveys, the Smithsonian Institution has become the depository of collections from several other sources, forming altogether a series of 12,000 specimens illustrative of the ornithology of North America; so that the materials for a general Report of this kind were ample. And it must be allowed, we think, that good use has been made of them. Even those who object to what they may term the new-fangled system of arrangement—the excessive subdivision of the genera and multiplication of species, and the unnecessary changes of old-established and familiar appellations—must admit that the divisions are generally well defined, the distinctive characters of the species, such as they

* *Vide* Am. Nat. Hist. ser. 3. vol. i. p. 369.

are, clearly pointed out, and that, where changes in the names have been introduced, it is generally only in strict obedience to rules, the object of which is to establish uniformity of nomenclature.

We must also again call attention to the admirable plan pursued, of cataloguing *every specimen obtained*, and giving not only its exact locality, but its dimensions. It is only by drawing specific characters from such a series, instead of describing from isolated individuals, that the great error which the late Prince Bonaparte (who in this respect, it must be confessed, often practised what he preached against) used to denounce so emphatically as that of "*describing specimens instead of species*," can be avoided.

While thus according praise, we must not neglect to protest against the occasionally rather numerous misprints in the book, which are certainly more frequent than they ought to be, and against the careless way in which the scientific names are sometimes written; such as *Thriothorus* instead of *Thryothorus* (θρύον, *arundo*), *Laniivireo* instead of *Laniivireo* (a barbarous compound at the best), *Hylatomus* for *Hylotomus* (ύλοτόμος), *Sphyrapius* for *Sphyrapius* (σφύρα et *pius*!), &c.

Prof. Baird's preface gives a brief sketch of the modern alterations in the arrangement of the non-rapacious land-birds, now very generally gaining ground, and which he himself adopts. From the list of authors mentioned as associated in this important reform, we must beg him to strike out the name of Reichenbach. In the 'Handbuch der Speciellen Ornithologie' of that laborious compiler, and the *miscalled* 'Avium Systema Naturale,' he will find little attention paid to Müller's great discoveries, but a complication of arrangement only to be compared to the dreams of the extinct Quinarians, or the fantasies of the author of the celebrated 'Entwickelungs-geschichte der Europäischen Thierwelt.'

Among the sixty-one North American Accipitres (which still retain their place at the head of the present arrangement), it can only be a strong feeling of patriotism that induces Mr. Cassin to retain in his list Audubon's *Falco Washingtonii*. This bird would, we suspect, have been long ago cast out by American ornithologists, were it not for its name. No one now believes in certain birds described by the great Le Vaillant as observed by himself in Africa; and the time is come when the existence of Washington's Eagle, as seen by the great Audubon in Kentucky, must be considered as equally mythical.

The *Scansores*, which take the next place, include thirty-five species, principally made up of Woodpeckers, which find a congenial habitation in what may be truly called "the continent of forests." But however much Prof. Baird may wish to add the magnificent *Campephilus imperialis* to the list of truly North American species, we suspect he will have to wait some time before he accomplishes it. There is good reason to believe that its true *habitat* is Guatemala—the country of the Long-tailed Trogon and Derbian *Orcophasis*—and that it probably does not occur even so far north as Mexico. A good deal of "annexation" must therefore take place before the imperial bird is brought within the limits of the great Republic.

The third order (*Insessores*), embracing 332 species—nearly half the whole number of North American birds known—is divided by Prof. Baird (à la Cabanis) into *Strisores*, *Clamatores*, and *Oscines*. The Humming-birds occurring within the area of the States, as now extended, are seven in number, the Swifts are four, and the Goatsuckers six, making seventeen members of the first of these groups. The second contains two Kingfishers, a stray Motmot, detected near the borders of Texas, in the State of New Leon, by the indefatigable collector Couch, and is made up of the many members of the difficult group *Colopteridæ*. Of the remaining section of *Oscines* North America has representatives of all the families that are known to occur in the New World,—a *Certhiola*, of the family *Cærebidæ*, the only one hitherto supposed absent, having been detected on the Florida Keys in time for the insertion of its occurrence in the Appendix.

The fourth order (*Rasores*) includes the Pigeons, with eleven species, and the *Gallinæ*, with twenty-one. Among the latter occurs one member of the Neotropical family of Guans (*Penelopidæ*), and two species of the genus *Meleagris*, the sole representative of the *Phasianidæ* in the New World. The lately established *Meleagris mexicana* of Mr. Gould is admitted as a probably good species. Eighty-four *Grallæ* and 175 *Ratatores* make up the total of 716 birds considered as properly belonging to this fauna, being an increase of 210 since the last general enumeration given by Audubon in 1838. Of these, however, a certain number, such as *Haliaëtus Washingtonii* (which we have already alluded to), *Chrysomitris Yarrellii*, and *C. magellanica*, both purely South American species, and a few others, might, we think, be advantageously removed to an “*Appendix specierum dubiarum*.”

A Life of Linnæus. By Miss BRIGHTWELL, of Norwich.
London, Van Voorst, 1858. 16mo.

IN this little biography of Linnæus, intended principally for the perusal of the rising generation, Miss Brightwell has portrayed in lively colours the principal scenes in the life of the great Swedish Naturalist. His early struggles, his ultimate success, his progress to a world-wide renown, and to the highest honours his country could bestow, are faithfully described; and Miss Brightwell has skilfully placed these in such a light as to show how much of human interest attaches to the life even of a laborious naturalist.

It is indeed from the fact that the latter term is strictly applicable to Linnæus throughout the whole of his career—alike when at Upsal he was under the necessity of patching his own shoes with paper, as when, arrived at the height of his reputation, he was graciously permitted to smoke his pipe even under the queen’s own nose—that Miss Brightwell derives the moral of her tale, pointing out that, great as might have been the native genius of the illustrious Swede, it was not by this alone, but by the most patient and unremitting